

REMARKS

In response to the Office Action mailed November 4, 2008, Applicant respectfully requests reconsideration. Claims 87-117 were previously pending in this application. Claim 87 has been amended to clarify that the two or more lipids are not a mixture containing lipids but are two or more individual lipids. Support for the amendment can be found in the specification as filed at least at page 12, line 37; and page 13, lines 6-8. Claims 99-116 have been amended to change the first word of the claim from "A" to "The". Claim 99 has been amended to omit concentrations associated with sodium chloride, glycerin, and propylene glycol. Support for this amendment can be found in the specification as filed at least at page 15, lines 18-20. Claim 117 has been amended to correct the omission of the word "acid" in the phrase: phosphotidic acid. Support for the amendment can be found in the specification as filed at least at page 20, Table 1. Claims 87-117 are now pending, with claim 87 being an independent claim. No new matter has been added.

Claim Rejections Under 35 USC § 103

The Examiner rejected claims 87-111, and 117 under 35 U.S.C. §103(a), as being unpatentable over Nyberg et al. (US 5,677,472) and Unger (US 6,521,211), individually or in combination, in view of Kissel (US 4,863,740), Papahadjopoulos (US 4,235,871), Lenk (US 4,522,803), and Kikuchi (US 4,687,661) individually or in combination.

Applicant has amended claim 87 to clarify that the process as claimed includes contacting at least two *individual* lipids with a first non-aqueous solvent that causes the lipids to dissolve and form a lipid solution. The additional process steps in claim 87 include contacting the lipid solution with a second non-aqueous solvent that causes the lipids to precipitate out as a solid lipid blend; collecting the solid lipid blend; contacting the solid lipid blend with a non-aqueous solvent to dissolve the blend forming a lipid blend solution; and contacting the lipid blend solution with an aqueous solution to yield a lipid suspension. Nyberg et al. does not teach a process of making a lipid blend from individual lipids, which is an important element of the claimed invention. In contrast, Nyberg et al. teaches beginning with a mixture and separating out phospholipids for further use. For example, in Example 1, Nyberg describes isolating crude (60%) sphingomyelin from fat

extract from buttermilk. As indicated by the Examiner at page 2 of the Office Action mailed November 4, 2008, "Nyberg et al. specifically indicates separation of phospholipids into different phases." Nyberg et al. describes purifying individual lipids from naturally occurring lipid mixtures and does not teach or suggest preparing a lipid blend from individual lipids, which is an element of claim 87, as amended. Thus, the Nyberg et al. '472 patent alone or in combination with the remaining references cited in the rejection fails to support a *prima facie* case of obviousness.

The Examiner also cites Unger et al., ('211 patent) as a primary reference in the rejection of claims 87-111, and 117 and states at page 3 of the Office Action that:

Unger et al. teach a process for preparing phospholipids comprising DPPA, DPPE-PEG5000, and DPPC(column 135, lines 29-31). The phospholipids mixture is added to a non-aqueous solvent system of methanol and toluene (column 135, line 34). The mixture was warmed to 55°C and allowed to form a thick gel (column 135, lines 36 and 39). Methyl t-butyl ether was added to the mixture to precipitate the solid material at 25°C and placed in a vacuum oven to dry (col 135, lines 40-42 and 44).

Applicant respectfully submits that this teaching by the Unger et al. '211 patent, which is relied upon by the Examiner in the rejection, was not disclosed in the Unger et al. application that was pending as of January 14, 1998, the effective filing date of the instant application. The '211 Unger patent matured from 09/243,640, which was filed February 3, 1999 as a continuation-in-part of application No. 09/218,660, filed on December 22, 1998, which is a continuation-in-part of application No. 08/660,032, filed June 6, 1996, which is a continuation-in-part of application No. 08/640,464, filed May 1, 1996, now abandoned, which is a continuation in part of application No. 08/496,684, filed on June 7, 1995. The subject matter relied upon by the Examiner in the rejection is subject matter that was not present in the application No. 08/660,032 but was added as new matter in application No. 09/218,660, filed December 22, 1998, which is after the effective filing date of the instant application.

The subject matter of the '211 patent that was cited by the Examiner in support of the rejection and is set forth above, was not present in the disclosures of the Unger applications filed prior to the Unger December 22, 1998 application filing. The subject matter of the '211 patent relied upon by the Examiner in the rejection of claims 87-111, and 117 is not available as prior art to the instant application and therefore does not support the rejection of the claims. Contrary to the

Examiners assertion, the disclosure of the application that matured into the '211 patent and is available as prior art to the instant invention does not teach preparing a phospholipid mixture, which is added to a non-aqueous solvent system of methanol and toluene, warmed to 55°C, and allowed to form a thick gel to which methyl t-butyl ether is added to precipitate the solid material and dried. The subject matter of the '211 patent that is available as prior art does not teach preparation of a lipid blend, a critical element of the claimed invention. The Unger et al. '211 patent alone or in combination with the remaining references cited in the rejection fails to support a *prima facie* case of obviousness.

The remaining references cited by the Examiner in the rejection do not teach the missing elements of the claims as amended. The Kissel et al. patent describes preparation of liposomes and does not teach or suggest methods of preparing a lipid blend prior to liposome preparation. Similarly, the Papahadjopoulos et al. patent describes methods of making liposomes but does not include or suggest methods of preparing a lipid blend as claimed in the instant claims as amended. Lenk et al. and Kikuchi et al. each also describe methods of making liposomes but neither reference teaches or suggests the instantly claimed process of using multiple non-aqueous solvents to prepare a lipid blend from two or more individual lipids.

The combination of the teaching of either of the two primary references with one or more of Kissel et al., Kikuchi et al., Papahadjopoulos et al., and Lenk et al. fails to teach the elements of the invention as claimed and the combination would not result in the invention as claimed. The combination of references fails to support a *prima facie* case of obviousness.

Accordingly, Applicant respectfully requests reconsideration and withdrawal of the rejection of claims 87-111, and 117 under 35 U.S.C. §103(a), as unpatentable over Nyberg et al. and Unger et al., individually or in combination, in view of Kissel et al., Papahadjopoulos et al., Lenk et al., and Kikuchi et al., individually or in combination.

The Examiner rejected claims 111-114 under 35 U.S.C. §103(a), as being unpatentable over Nyberg et al. (US 5,677,472) and Unger (US 6,521,211), individually or in combination, in view of Kissel (US 4,863,740), Papahadjopoulos (US 4,235,871), Lenk (US 4,522,803), and Kikuchi (US 4,687,661) individually or in combination, further in view of Swaerd-Nordmo (US 6,165,442).

Applicant has amended claim 87, from which claims 111-114 depend, to clarify that the process as claimed includes contacting at least two *individual* lipids with a first non-aqueous solvent that causes the lipids to dissolve and form a lipid solution. The additional process steps in claim 87 include: contacting the lipid solution with a second non-aqueous solvent that causes the lipids to precipitate out as a solid lipid blend; collecting the solid lipid blend; contacting the solid lipid blend with a non-aqueous solvent to dissolve the blend forming a lipid blend solution; and contacting the lipid blend solution with an aqueous solution to yield a lipid suspension.

As described above, Nyberg et al. describes purifying individual lipids from naturally occurring lipid mixtures and does not teach or suggest preparing a lipid blend from individual lipids, which is an element of claim 87, as amended. The teaching of the Nyberg et al. '472 patent alone, or in combination with the remaining references cited in the rejection, fails to support a *prima facie* case of obviousness.

As described above, the disclosure of the Unger et al. '211 patent that was relied upon by the Examiner in the rejection of claim 111-114 was not included in the Unger et al. priority documents that predate the effective filing date of the instant application and therefore is not available as prior art to the invention as claimed. The portion of the Unger '211 patent disclosure that is available as prior art to the instant invention fails to teach contacting two or more individual lipids with a first non-aqueous solvent to form a lipid solution and contacting the lipid solution with a second non-aqueous solvent that causes the lipids to precipitate out as a solid lipid blend. Thus, the disclosure of Unger et al. '211 patent that is available as prior art to the instant claims does not independently or in combination with the remaining references cited in the rejection support a *prima facie* case of obviousness.

The remaining references cited by the Examiner in the rejection of claims 111-114, in combination with Unger et al., and Nyberg et al., references fail to teach the missing elements of the claims as amended and do not support a *prima facie* case for obviousness. The Kissel et al. patent describes preparation of liposomes and does not teach methods of preparing a lipid blend prior to liposome preparation. Similarly, the Papahadjopoulos et al. patent describes methods of making liposomes that do not include preparing a lipid blend as claimed in the instant claims as amended. Lenk et al. and Kikuchi et al. each also describe methods of making liposomes but neither reference

teaches or suggests the instantly claimed methods that include making a lipid blend from two or more individual lipids. The Examiner indicates that Swaerd-Nordmo et al. patent describes the incorporation of perfluoropropane in vesicles as a contrast agent. Applicant submits that the teaching of Swaerd-Nordmo et al. fails to teach or suggest methods to make a lipid blend as claimed. The combination of the teaching of either of the two primary references with one or more of Kissel et al., Kikuchi et al., Papahadjopoulos et al., and Lenk et al. in further view of Swaerd-Nordmo et al. fails to teach all elements of the invention and if combined would not result in the invention as claimed.

Accordingly, Applicant respectfully requests reconsideration and withdrawal of the rejection of claims 87-111, and 117 under 35 U.S.C. §103(a), as unpatentable over Nyberg et al. and Unger et al., individually or in combination, in view of Kissel et al., Papahadjopoulos et al., Lenk et al., and Kikuchi et al., individually or in combination, further in view of Swaerd-Nordmo et al.

The Examiner rejected claim 115 under 35 U.S.C. §103(a), as being unpatentable over Nyberg (5,677,472) or Unger (6,521,211), individually or in combination, in view of Kissel (4,863,740), Papahadjopoulos (4,235,871), Lenk (4,522,803), and Kikuchi (4,687,661), individually or in combination, further in view of Swaerd-Nordmo (US 6,165,442) and Unger (US 6,071,495).

Applicant has amended claim 87, from which claim 115 ultimately depends, to clarify that the process as claimed includes contacting at least two *individual* lipids with a first non-aqueous solvent that causes the lipids to dissolve and form a lipid solution. As described above, the additional process steps in claim 87 include contacting the lipid solution with a second non-aqueous solvent that causes the lipids to precipitate out as a solid lipid blend; collecting the solid lipid blend; contacting the solid lipid blend with a non-aqueous solvent to dissolve the blend forming a lipid blend solution; and contacting the lipid blend solution with an aqueous solution to yield a lipid suspension.

As indicated above, Nyberg et al. describes purifying individual lipids from naturally occurring lipid mixtures and does not teach or suggest preparing a lipid blend from individual lipids, which is a critical element of claim 87, as amended. As described above, the teaching relied upon in the Unger et al. '211 patent was not included in the priority documents that predate the effective

filing date of the instant application and therefore is not available as prior art to the invention as claimed. The remaining teaching of the Unger et al. '211 patent does not disclose a process of contacting two or more individual lipids with a first non-aqueous solvent that causes the lipids to dissolve and form a lipid solution and then contacting the lipid solution with a second non-aqueous solvent that causes the lipids to precipitate out as a solid lipid blend. Thus, the disclosure of Unger et al. '211 patent that is available as prior art to the instant claims does not independently or in combination with the remaining references cited in the rejection support a *prima facie* case of obviousness.

The remaining references cited by the Examiner in the rejection do not teach the missing elements of the claims as amended. The Kissel et al. patent describes preparation of liposomes and does not teach methods of preparing a lipid blend as a step in preparing a lipid suspension. Similarly, the Papahadjopoulos et al. patent describes methods of making liposomes that do not include preparing a lipid blend as claimed in the instant claims as amended. Lenk et al. and Kikuchi et al. each also describe methods of making liposomes but neither reference teaches or suggests the instantly claimed steps that include making a lipid blend from two or more individual lipids. The Examiner indicates that Swaerd-Nordmo et al. patent describes the incorporation of perfluoropropane in vesicles as a contrast agent. Applicant submits that the teaching of Swaerd-Nordmo et al. fails to teach or suggest methods to make a lipid blend as claimed. In addition, the Examiner references the Unger et al. '495 patent as teaching sterilization of liposomes. Applicant submits that the Unger et al. '495 patent fails to teach or suggest a process of preparing a lipid blend of two or more individual lipids and therefore fails to remedy the deficiencies in the rejection.

Applicant respectfully submits that a *prima facie* case of obviousness has not been made. The combination of the teaching of either of the two primary references with one or more of Kissel et al., Kikuchi et al., Papahadjopoulos et al., and Lenk et al. in further view of Swaerd-Nordmo et al. or the Unger et al. '495 patent fails to teach each element of the claimed invention and the combination does not result in the invention as claimed. Therefore, a *prima facie* case of obviousness has not been made.

Accordingly, Applicant respectfully requests reconsideration and withdrawal of the rejection of claim 115 under 35 U.S.C. §103(a), as unpatentable over Nyberg et al. and Unger et al.,

individually or in combination, in view of Kissel et al., Papahadjopoulos et al., Lenk et al., and Kikuchi et al., individually or in combination, further in view of Swaerd-Nordmo et al. and the Unger et al. '495 patent.

The Examiner rejected claim 117 under 35 U.S.C. §103(a), as being unpatentable over Nyberg (5,677,472) in view of Kissel (4,863,740), or Papahadjopoulos (4,235,871), or Lenk (4,522,803), or Kikuchi (4,687,661), individually or in combination, further in view of Unger (US 6,071,740).

Applicant has amended claim 87, from which claim 117 ultimately depends, to clarify that the process as claimed includes contacting at least two *individual* lipids with a first non-aqueous solvent that causes the lipids to dissolve and form a lipid solution. As described above, the process steps in claim 87 also include contacting the lipid solution with a second non-aqueous solvent that causes the lipids to precipitate out as a solid lipid blend; collecting the solid lipid blend; contacting the solid lipid blend with a non-aqueous solvent to dissolve the blend forming a lipid blend solution; and contacting the lipid blend solution with an aqueous solution to yield a lipid suspension.

As described above, Nyberg et al. does not teach a process of making a lipid blend from individual lipids, which is an important element of the claimed invention. Nyberg et al. describes purifying individual lipids from naturally occurring lipid mixtures and does not teach or suggest preparing a lipid blend from individual lipids. The Nyberg et al. '472 patent alone or in combination with the remaining references cited in the rejection fails to support a *prima facie* case of obviousness.

The remaining references cited by the Examiner in the rejection do not teach the missing elements of the claims as amended. The Kissel et al., Papahadjopoulos et al., Lenk et al., and Kikuchi et al. references each describe methods of making liposomes but none of the cited reference teaches or suggests the instantly claimed methods that include making a lipid blend from two or more individual lipids. Applicant submits that the Unger '495 patent fails to teach or suggest a process of preparing a lipid blend of two or more individual lipids and therefore fails to remedy the deficiencies in the rejection.

The combination of the teaching of either of the primary reference (Nyberg et al.) with one or more of Kissel et al., Kikuchi et al., Papahadjopoulos et al., and Lenk et al. in further view of the Unger et al. '740 patent fails to teach all elements of the invention as claimed and a *prima facie* case of obviousness has not been made.

Accordingly, Applicant respectfully requests reconsideration and withdrawal of the rejection of claim 117 under 35 U.S.C. §103(a), as unpatentable over Nyberg et al. in view of Kissel et al., or Papahadjopoulos et al., or Lenk et al., or Kikuchi et al., individually or in combination, further in view of the Unger et al. '740 patent.

The Examiner rejected claims 87-111 under 35 U.S.C. §103(a), as being unpatentable over Kissel, or Papahadjopoulos, or Lenk, or Kikuchi, individually or in combination.

Applicant has amended claim 87 to clarify that the process as claimed includes contacting at least two *individual* lipids with a first non-aqueous solvent that causes the lipids to dissolve and form a lipid solution. As claimed, the lipid solution is contacted with a second non-aqueous solvent that causes the lipids to precipitate forming a solid lipid blend. The solid lipid blend is contacted with an additional non-aqueous solvent to dissolve the blend forming a lipid blend solution; and the lipids in a non-aqueous solvent is then contacted with an aqueous solution to yield a lipid suspension. The steps of contacting individual lipids with non-aqueous solvents followed by contacting the resulting lipid blend solution with an aqueous solvent are critical to carrying out the process as claimed.

The Kissel et al., Papahadjopoulos et al., Lenk et al. and/or Kikuchi et al. references cited by the Examiner fail to teach or suggest critical elements of the claimed process of making a lipid blend and lipid suspension from individual lipids. The combination of the teaching of the primary references, in view of Nyberg et al. would not result in the invention as claimed and would not yield predictable results. In addition, the Examiner has not set forth a motivation for one to combine the lipid extraction methods of Nyberg et al. with the liposome preparation methods of the primary references to make the invention as claimed. Applicant submits that a *prima facie* case for obviousness has not been made.

Claim 87 as amended is drawn to a process that includes the step of preparing a lipid blend and lipid suspension from individual lipids. Preparing the blend and suspension using various non-aqueous solvents as set forth in the claims, is a critical aspect of the claimed invention. The Examiner indicates at page 7 of the Office Action that the "criticality of these steps is unclear to the examiner if one is using pure phospholipids just as used in Kissel, Papahadjopoulos, Lenk, and Kikuchi. Since the removal of impurities by precipitation is well-known in the art of chemistry, instant claims are deemed obvious to one of ordinary skill in the art." The Examiner has concluded that steps (a) –(c) of claim 87 are not critical to the invention. The Federal Circuit has stated that "rejections on obviousness cannot be sustained with mere conclusory statements; instead, there must be some articulated reasoning with some rational underpinning to support the legal conclusion of obviousness." *In re Kahn*, 441 F.3d 977, 988, 78 USPQ2d 1329, 1336 (Fed. Cir. 2006). See also *KSR*, 550 U.S. at ___, 82 USPQ2d at 1396.

Applicant respectfully submits that the steps of contacting the individual lipids with a series of non-aqueous solvents followed by an aqueous solvent as set forth in claim 87 are critical elements of the invention. The elements are critical, not as suggested by the Examiner for the removal of impurities, but rather as steps for blending two or more individual lipids together into a uniform lipid blend and lipid suspension of the invention. The criticality of contacting two or more lipids with a series of non-aqueous solvents and an aqueous solvent has basis in the recognition by the inventors that the series of solvent steps are important for obtaining a uniform lipid blend for use in the later steps of preparing a lipid suspension. As described on page 1 of the application as filed, the claimed process was developed to address several major obstacles that impeded the uniformity and proper hydration of lipid suspensions. Contrary to the Examiner's conclusion that the steps of claim 87 (a) - (c) are not critical, the steps of contacting two or more individual lipids with a series of non-aqueous solvents followed by contact with an aqueous solvent as set forth in claim 87, are critical steps in the invention as claimed.

Critical steps for preparing a lipid blend and suspension of claim 87 are not taught or suggested by the combination of Kissel et al., Papahadjopoulos et al., Lenk et al., and/or Kikuchi et al. references either alone or in combination, or in view of Nyberg et al. In addition, the Examiner

has not shown motivation for one of ordinary skill in the art to combine the cited primary references with Nyberg et al. to make the claimed invention. Kissel et al., Papahadjopoulos et al., Lenk et al., and Kikuchi et al. teach the use of various mixtures of lipids for liposome preparation. Neither the primary references nor Nyberg et al. recognize or suggest the importance of using a series of solvents to make a uniform lipid blend or lipid blend solution as set forth in claim 87. Nyberg et al. teaches precipitation methods using polar and non-polar solvents to extract a single lipid, sphingomyelin, from a lipid-containing fat concentrate. Applicant submits that the Examiner has not elucidated a motivation for one of ordinary skill in the art to combine Nyberg et al. methods of isolating a single lipid with methods of using mixtures of lipids to make liposomes as set forth in the primary references to make the invention as claimed. Because Nyberg et al. teaches extraction of a single lipid and the primary references teach mixtures of lipids to make liposomes, one of ordinary skill in the art would also not predict that the teaching of Nyberg et al. combined with the teaching of the primary references would result in the instantly claimed invention.

Kissel, et al., describes processes for making liposomes using lecithin or lecithin and an additional lipid. A method taught by Kissel et al. includes forming a solution of lecithin and cholesterol in a suitable organic solvent, followed by evaporation to produce a film that is then taken up in an aqueous solvent (see col. 3, lines 60-64). This procedure does not include contacting the lipids with a series of non-aqueous solvents to make a uniform blend of lipids and does not include contacting the lipids in a non-aqueous solvent with an aqueous solvent. Thus, Kissel et al. teaches away from the critical steps of blending individual lipids, as set forth in claim 87. In addition, Kissel et al. Example 4A teaches mixing lecithin and phosphatidylserine in tert-butanol, irradiating the solution, and then freeze drying. The freeze-dried material is taken up in an aqueous buffer and used to prepare liposomes. Again, the procedure taught by Kissel et al. discloses steps Kissel concluded were sufficient to prepare liposomes. Thus, Kissel et al. teaches away from making a lipid blend by inclusion of additional steps of contacting lipids with a series of non-aqueous solvents followed by an aqueous solvent as set forth in the process of claim 87.

Lenk et al. also fails to teach or suggest the critical steps of lipid blend preparation of the invention as claimed and teaches away from the methods as claimed. For example, at column 18, lines 8-13, Lenk et al., describes the process of preparing stable plurilamellar vesicles (SPLV). The

process includes dissolving a lipid or mixture of lipids into an organic solvent, adding an aqueous phase and the material to be encapsulated and sonicating the mixture. There is no teaching or suggestion of steps to prepare a solid lipid blend by contacting individual lipids with two different non-aqueous solvents and dissolving the solid lipid blend with a third non-aqueous solvent to form a lipid blend solution. The Lenk et al. reference fails to teach or suggest the use of a series of non-aqueous solvent steps, which are critical elements of the instantly claimed invention. The teaching of Lenk et al., would suggest to one of skill in the art that the procedure disclosed by Lenk et al. would be sufficient to prepare liposomes. This conclusion teaches away from making a lipid blend by including the additional steps of contacting lipids with a series of non-aqueous solvents followed by an aqueous solvent as set forth in the process of claim 87.

Papahadjopoulos et al. also fails to teach or suggest the instantly claimed process that includes preparing a solid lipid blend using a series of non-aqueous solvents and teaches away from the invention as set forth in independent claim 87. Papahadjopoulos et al. describes a process that includes contacting lipids in chloroform, evaporating the chloroform, and adding an aqueous solvent to the remaining lipids. The critical step of contacting lipids in a non-aqueous solvent with a second non-aqueous solvent to precipitate out a solid lipid blend are not taught or suggested by Papahadjopoulos et al. The teaching of Papahadjopoulos et al. would suggest to one of skill in the art that it is sufficient to evaporate the non-aqueous solvent and there would be no reason to add an additional step of contacting the lipids with another non-aqueous solvent. The Papahadjopoulos et al. reference fails to teach or suggest the use of a series of non-aqueous solvent steps, which are critical elements of the instantly claimed invention.

Kikuchi et al. also fails to teach or suggest the instantly claimed process that includes preparing a solid lipid blend using a series of non-aqueous solvents. Kikuchi et al. describes a simple process of contacting lipids with a non-aqueous solvent and then simply adding an aqueous solvent to the mixture. This teaching suggests to one of skill in the art that the resulting lipid mix is sufficient to make liposomes. This contrasts with the teaching in the instant disclosure, which recognizes that additional steps are critical for the preparation of a lipid blend and lipid suspension. Kikuchi et al. teaches away from a more complex method that results in a uniform lipid blend as set forth in the instant claims.

None of the primary references cited by the Examiner either describes or suggests mixing lipids with various non-aqueous solvents to make a lipid blend. In fact, each of the cited references teaches away from the use of the lipid blend preparation steps that are critical to the invention as claimed. The missing elements of the invention as claimed are not remedied by combining the teaching of the primary references, Kissel et al., Papahadjopoulos et al, Lenk et al., and Kikuchi et al. with teaching of Nyberg et al.

As described above, Nyberg et al. teaches precipitation methods to extract a lipid from a mixture. One of skill in the art would have no motivation to combine the Nyberg et al. methods of single lipid extraction with the teaching of the primary references to make the invention as claimed. There would be no motivation for one of ordinary skill in the art to utilize a lipid extraction method of Nyberg et al. to make a mixture of lipids in preparation of liposomes as set forth in the primary references. In addition, one of ordinary skill in the art would have no reasonable expectation of success in combining the teaching of Nyberg et al. with that of the primary references to make the claimed invention. In fact, when starting with individual lipids as in the instantly claimed invention, the combination of lipid purification methods of Nyberg et al., with liposome preparation methods of Kissel et al., Papahadjopoulos et al., Lenk et al., and Kikuchi et al. would not result in the instantly claimed invention, in part because a critical element of the invention as claimed is the blending of individual lipids, not the extraction of individual lipids as taught in Nyberg et al.

As discussed above, the missing elements of the Kissel, et al., Papahadjopoulos, et al, Lenk et al., and Kikuchi et al. are not provided by general knowledge in the art as evidenced by Nyberg et al. Nyberg et al. describes lipid purification methods that are not relevant to the preparation of lipid blends as instantly claimed and the combined teaching of Nyberg, with that of one or more of the Kissel, et al., Papahadjopoulos, et al, Lenk et al., and/or Kikuchi et al. fail to teach each element of the invention as claimed. There would be no motivation for one of skill in the art to combine the methods of extracting a single lipid taught by Nyberg et al. with procedures to mix lipids to prepare liposomes as set forth in the Kissel, et al., Papahadjopoulos, et al, Lenk et al., and Kikuchi et al. In addition, even if the teaching of the primary references were to be combined with that of Nyberg et al., it would not result in the invention as claimed. Thus, a *prima facie* case for obviousness has not been made.

Accordingly, Applicant respectfully requests reconsideration and withdrawal of the rejection of claims 87-111 under 35 U.S.C. §103(a), as being unpatentable over Kissel, or Papahadjopoulos, or Lenk, or Kikuchi, individually or in combination

The Examiner rejected claim 117 under 35 U.S.C. §103(a), as being unpatentable over Kissel, or Papahadjopoulos, or Lenk, or Kikuchi, individually or in combination as set forth above, further in view of Unger 6,415,740.

As described above herein, Kissel, or Papahadjopoulos, or Lenk, or Kikuchi, individually or in combination fail to teach each element of claim 87, from which claim 117 ultimately depends. None of the cited references either alone or in combination teach contacting two or more individual lipids with a series of non-aqueous solvents to prepare a lipid blend. The teaching of the Unger '740 patent fails to provide the missing elements and the combination of the teaching of the primary references in view of Unger '740 patent would not result in the invention as claimed. Therefore, a *prima facie* case of obviousness has not been made.

Accordingly, Applicant respectfully requests reconsideration and withdrawal of the rejection of 117 under 35 U.S.C. §103(a), as being unpatentable over Kissel, or Papahadjopoulos, or Lenk, or Kikuchi, individually or in combination as set forth above, further in view of Unger 6,415,740.


CONCLUSION

In view of the above amendments and arguments, applicant believes the pending application is in condition for allowance.

A petition for a three-month extension of time to respond is filed herewith. If there is an additional fee occasioned by this response, that is not covered, please charge any deficiency to Deposit Account No. 23/2825 under Docket No. N0469.70022US02 from which the undersigned is authorized to draw.

Dated: April 30, 2009

Respectfully submitted,

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